

CLAIMS:

What is claimed is:

1. An electrical connector for interconnecting a pair of spaced conductors, comprising:

5 a dielectric housing including a top wall having a top opening, a bottom wall having a bottom opening generally aligned vertically with the top opening, a separator wall between the top and bottom walls and combining therewith to define top and bottom cavities above and below the separator wall; and

10 a one-piece conductive terminal including a generally U-shaped body portion defined by a pair of mounting arms joined at proximal ends thereof by a cross portion, the U-shaped body portion embracing said separator wall with the mounting arms located on opposite sides of the separator wall in the top and bottom cavities, a pair of resilient contact arms extending from the distal ends of the mounting arms into the top and bottom cavities, and the contact arms having contact portions projecting through the openings in the top and bottom walls for engaging said spaced conductors.

2. The electrical connector of claim 1 wherein said one-piece conductive terminal is stamped and formed of sheet metal material.

3. The electrical connector of claim 1 wherein said one-piece terminal is symmetrical on opposite sides of said separator wall.

4. The electrical connector of claim 1 wherein each of said cavities is bounded on opposite sides thereof by a pair of spaced side walls, and including opposing guide slots in the side walls for receiving side edges of the respective mounting arm of the terminal.

5. The electrical connector of claim 4 wherein the side edges of the mounting arms include fixing sections for fixing the mounting arms in said guide slots.

6. The electrical connector of claim 1 wherein said contact arms include stopping portions engageable with inside surfaces of the top and bottom walls of the housing adjacent said openings to limit the extent that the contact portions can project through said openings.

7. The electrical connector of claim 6 wherein said contact arms are assembled into the cavities with a spring preload, with said stopping portions maintained in engagement with the inside surfaces of the top and bottom walls.

8. The electrical connector of claim 1 wherein the cross portion of said U-shaped body portion of the terminal is enlarged to form a manual gripping knob of the terminal for facilitating inserting the terminal into said cavities on opposite sides of said separator wall.

9. An electrical connector for interconnecting a pair of spaced conductors, comprising:

5 a dielectric housing including a top wall having a top opening, a bottom wall having a bottom opening generally aligned vertically with the top opening, a separator wall between the top and bottom walls and combining therewith to define top and bottom cavities above and below the separator wall, each of said cavities being bounded on opposite sides thereof by a pair of spaced side walls and including guide slots in the side walls; and

10 a one-piece conductive terminal stamped and formed of sheet metal material and being symmetrical on opposite sides of said separator wall, the terminal including a generally U-shaped body portion defined by a pair of mounting arms joined at proximal ends thereof by a cross portion, the U-shaped body portion embracing said separator wall with the mounting arms located on opposite sides of the separator wall in the top and bottom cavities within the guide slots in side walls of the housing, a pair of resilient contact arms extending from the distal ends of the mounting arms into the top and bottom cavities, and the contact arms having contact 15 portions projecting through the openings in the top and bottom walls for engaging said spaced conductors.

10. The electrical connector of claim 9 wherein the side edges of the mounting arms include fixing sections for fixing the mounting arms in said guide slots.

11. The electrical connector of claim 9 wherein said contact arms include stopping portions engageable with inside surfaces of the top and bottom walls of the housing adjacent said openings to limit the extent that the contact portions can project through said openings.

12. The electrical connector of claim 11 wherein said contact arms are assembled into the cavities with a spring preload, with said stopping portions maintained in engagement with the inside surfaces of the top and bottom walls.

13. The electrical connector of claim 9 wherein the cross portion of said U-shaped body portion of the terminal is enlarged to form a manual gripping knob of the terminal for facilitating inserting the terminal into said cavities on opposite sides of said separator wall.

CLAIMS**AMENDED CLAIMS**

[received by the International Bureau on 22 February 2005 (22.02.05)
original claims 1-8 amended; original claims 9-13 cancelled.

1. An electrical connector (10) for interconnecting a pair of spaced conductors (12), comprising:

a dielectric housing (16) including a top wall (20) having a top opening (22), a bottom wall (24) having a bottom opening (26) generally aligned vertically with the top opening, a separator wall (28) between the top and bottom walls and combining therewith to define top and bottom cavities (32,34) above and below the separator wall, each of the cavities being bounded on opposite sides thereof by a pair of spaced side walls (30), the separator wall (28) connecting the pair of spaced side walls; and

a one-piece conductive terminal (18) including a generally U-shaped body portion (40) defined by a pair of mounting arms (42) joined at proximal ends thereof by a cross portion (44), the U-shaped body portion embracing said separator wall with the mounting arms located on opposite sides of the separator wall in the top and bottom cavities, a pair of resilient contact arms (48) extending from the distal ends of the mounting arms into the top and bottom cavities, and the contact arms having contact portions (50) projecting through the openings in the top and bottom walls for engaging said spaced conductors.

2. The electrical connector of claim 1 wherein said one-piece conductive terminal (18) is stamped and formed of sheet metal material.

3. The electrical connector of claim 1 wherein said one-piece terminal (18) is symmetrical on opposite sides of said separator wall (28).

4. The electrical connector of claim 1 wherein opposing guide slots (38) are in the side walls (30) for receiving side edges of the respective mounting arm (42) of the terminal (18).

5. The electrical connector of claim 4 wherein the side edges of the mounting arms (42) include fixing sections (58) for fixing the mounting arms in

said guide slots (38).

6. The electrical connector of claim 1 wherein said contact arms (48) include stopping portions (56) engageable with inside surfaces of the top and bottom walls (20,24) of the housing (16) adjacent said openings (22,26) to limit the extent that the contact portions (50) can project through said openings.

7. The electrical connector of claim 6 wherein said contact arms (48) are assembled into the cavities (32,34) with a spring preload, with said stopping portions (56) maintained in engagement with the inside surfaces of the top and bottom walls (20,24).

8. The electrical connector of claim 1 wherein the cross portion (44) of said U-shaped body portion (40) of the terminal (18) is enlarged to form a manual gripping knob of the terminal for facilitating inserting the terminal into said cavities (32,34) on opposite sides of said separator wall (28).